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93-005916 Mooi, Randall D. PHYLOGENY OF THE PLESIOPIDAE (PISCES: PERCIFORMES) WITH EVIDENCE FOR THE INCLUSION OF THE ACANTHOCLINIDAE. *Bull. Mar. Sci.* 52(1):284-326. 1993. FR 38(3)
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[Dep. Palaeontol., Nat. Hist. Mus., London SW7 5BD, England]

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[Dep. Zool., Univ. Mus., Univ. Tokyo, 7-3-1, Hongo, Bunkyo-ku, Tokyo 113, Japan]

-005924 Smith, Hobart M. COMMENT ON THE PROPOSED CONSERVATION OF THE SPECIFIC NAME *CLIOLA (HYBOPSIS) TOPEKA* GILBERT, 1884 (CURRENTLY *NOTROPIS TOPEKA*) (OSTEICHTHYES, PRINIFORMES). *Bull. Zool. Nomencl.* 50(2):144. 1993. Abstract only. FR 38(3)
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-005925 Springer, Victor G. DEFINITION OF THE SUBORDER BLENNIOIDEI AND ITS INCLUDED MILIES (PISCES: PERCIFORMES). *Bull. Mar. Sci.* 52(1):472–495. 1993. FR 38(3)
[Div. Fishes, Dep. Vertebr. Zool., Natl. Mus. Nat. Hist., Washington, DC 20560]

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[Dep. Geol., Geogr., & Environ. Studies, Calvin Coll., 3201 Burton Ave., Grand Rapids, MI 49546] *achymystax, Acantholingua, Salmothymus, Hucho, Salvelinus,* and *Salmo.*

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[NOAA/NURP R/OR-2, 1335 East-West Hwy. MC 5258, Silver Spring, MD 20910] *Eknomoliparis iirichignoae, Paraliparis molinai, P. merodontus,* and data for eight other species.

-005928 Stepien, Carol A.; Michael T. Dixon and David M. Hillis. EVOLUTIONARY RELATIONSHIPS OF HE BLENNIOID FISH FAMILIES CLINIDAE, LABRISOMIDAE AND CHAENOPSIDAE: CONGRUENCE TWEEN DNA SEQUENCE AND ALLOZYME DATA. *Bull. Mar. Sci.* 52(1):496–515. 1993. FR 38(3)
[Dep. Biol., Case-West. Reserve Univ., 10900 Euclid Ave., Cleveland, OH 44106-7080] *Chaenopsis* and *brisomus.*

-005929 Stiassny, Melanie L. J. WHAT ARE GREY MULLETS? *Bull. Mar. Sci.* 52(1):197–219. 1993. FR 38(3)
[Dep. Herpetol. & Ichthyol., Am. Mus. Nat. Hist., New York, NY 10024]

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[Atlantic Res. Inst. Fish. & Oceanogr., Kaliningrad, Russia] *L. capensis, L. natalensis, A. marginata,* and *T. lchristi.*

3-005933 van der Heiden, Albert M. and Sergio Mussot Perez. *DORSOPSETTA* AND *D. NORMA*, BOTH IELSEN, 1963, JUNIOR SYNONYMS OF *CYCLOPSETTA* GILL, 1889, AND *C. QUERNA* (JORDAN AND OLLMAN, 1890) (PLEURONECTIFORMES: PARALICHTHYIDAE). *Copeia* 1993(2):557–560. 1993. FR 38(3)
[Inst. Cienc. Mar & Limnol., Univ. Nac. Autonoma Mexico, Estac. Mazatlan, Apdo. Postal 811, Mazatlan, naloa C.P. 82000, Mexico] *C. panamensis* in Mexico.

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[Div. Fishes, Field Mus. Nat. Hist., Roosevelt Rd. at Lake Shore Dr., Chicago, IL 60605-2496]

-005935 Winterbottom, Richard and Mary Burridge. REVISION OF THE SPECIES OF *PRIOLEPIS* SESSING A REDUCED TRANSVERSE PATTERN OF CHEEK PAPILLAE AND NO PREDORSAL SCALES OSTEI; GOBIIDAE). *Can. J. Zool.* 71(3):494–514. 1993. In English with French summ. FR 38(3)
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93-005939 Alderman, D. J. MONITORING AND SURVEILLANCE OF BIOLOGICAL CONTAMINANTS AND DISEASE IN THE AQUATIC ENVIRONMENT 1990. *Fish. Res. Aquat. Environ. Monit. Rep. Minist. Agric. Fish Food (Lowestoft)* No. 35. 35p. 1993. FR 38(3)

[MAFF, Fish. Dis. Lab., 14 Albany Rd., Granby Ind. Estate, Weymouth, Dorset DT4 9TH, England] *Limanda limanda* in the United Kingdom.

93-005940 Bowser, Paul R.; John G. Babish and Gregory A. Wooster. PHARMACOKINETICS OF ENROFLOXACIN IN RAINBOW TROUT (*ONCORHYNCHUS MYKISS*). *1989 Joint Meeting of the Fish Health Section/AFS Eastern Fish Health Workshop, Annapolis, Maryland, July 17-20,* 1989. Frank Hetrick, coordinator. p. 31. 1989. Abstract only. FR 38(3)

[Dep. Avian & Aquat. Anim. Med., N.Y. State Coll. Vet. Med., Cornell Univ., Ithaca 14853]

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[Inst. Agric. Res., Dep. Agric., Mabegondo, La Corunna, Spain] *Oncorhynchus mykiss.*

93-005942 Bruno, David W. PATHOLOGICAL CONDITIONS OF WILD SALMONIDS. *Fish. Res. (Amst.)* 17(1-2):1-2. 1993. FR 38(3)

[SOAFD, Mar. Lab., Victoria Rd., Aberdeen, Scotland] *Salmo salar* in the United Kingdom.

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[MAFF, Fish Dis. Lab., 14 Albany Rd., Granby Ind. Estate, Weymouth DT4 9TH, England]

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[Dep. Zool., Univ. Manitoba, Winnipeg, MB, Canada R3T 2N2]

93-005946 De Kinkelin, P. and B. J. Hill. THE OFFICE INTERNATIONAL DES EPIZOOTIES (OIE) AND PREVENTION OF DISEASES IN AQUACULTURE. *1989 Joint Meeting of the Fish Health Section/AFS Eastern Fish Health Workshop, Annapolis, Maryland, July 17-20,* 1989. Frank Hetrick, coordinator. p. 70. 1989. Abstract only. FR 38(3)

[Lab. Ichtyopathol., INRA, 78350 Jouy-en-Josas, France]

93-005947 Francis-Floyd, Ruth. EXTRA-LABEL DRUG USE IN AQUACULTURE. *J. Am. Vet. Med. Assoc.* 202(10):1651-1654. 1993. FR 38(3)

[Dep. Large Anim. Clinical Sci. & Fish. & Aquat. Sci., Univ. Fla., 7922 NW 71st St., Gainesville 32606] *Cyprinus carpio, Ictalurus punctatus, Pterophyllum scalare, Acipenser oxyrhynchus desotoi,* and *Carassius auratus.*

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BOOK REVIEW

Munshi, J.S. Datta, and G.M. Hughes. 1992. *Air-breathing Fishes of India: Their Structure, Function and Life History*. A.A. Balkema Uitgevers B.V., Postbus 1675, NL-3000 BR Rotterdam, The Netherlands. xx + 338 pp. (ISBN 90-6191-954-1). Available from the publisher at $90.00 (cloth).

Fishes in India occupy every nuance of aquatic habitat imaginable—and then some. Invaders in montane torrents (hill-stream fishes) and those enduring anoxic wetland ooze (air-breathing fishes) are at extremes of vertebrate adaptation in Indian fresh waters. Air breathing arose several times in fish lineages and, accordingly, the authors discuss a wide range of morphology, physiology, and life styles among teleosts.

The book is organized as 30 chapters, usually quite brief, on virtually anything about Indian air-breathing teleosts—ranging from evolution and ecology through functional anatomy to cytogenetics and aquaculture. The most inclusive and detailed sections are on respiratory physiology, circulation, and anatomy associated with breathing. Most other chapters tend to be haphazard and perfunctory, however, such as those on the pituitary gland (three pages) and the reproductive cycle (one page).

Altogether, 14 air-breathing species representing 9 families of Indian teleosts are reviewed in scattered, rather uneven detail, including two featherbacks (*Notopterus chitala*, *N. notopterus*), a labyrinth catfish (*Clarias batrachus*), an airsac catfish (*Heteropneustes fossilis*), four snakeheads (*Channa gachua*, *C. marulius*, *C. punctata*, *C. striata*), a swamp-eel (*Monopterus cuchia*), a spiny-eel (*Mastacembelus pancalus*), two gobies (*Boleophthalmus boddarti*, *Periophthalmus vulgaris*), a climbing gourami (*Anabas testudineus*), and a gourami (*Colisa fasciata*). Four other Indian air-breathing fishes are listed, then ignored. Intestinal gas exchange, seen in the Indian loach *Lepidocephalichthys guntea*, is barely mentioned.

The authors' stated goal is to synthesize data from their 80 books and articles on air-breathing fishes, as well as from contributions by their students and coworkers. More than 400 references are cited, including many from less accessible Indian theses and symposium proceedings. Although a span of at least 30 years of dedicated research by Dr. Munshi is represented, the scholarly quality of this book is seriously marred by a lack of technical editing. Typographic errors, omissions, and inconsistencies are ubiquitous and quite distracting, even in casual browsing. On the other hand, readers will appreciate the generous array of illustrations, provided as clear half-tone photographs and line drawings.

Although not for the beginning student, I recommend this book for its firsthand observations and insights on respiratory morphology and physiology of air-breathing teleosts in India.—John S. Ramsey, U.S. Fish and Wildlife Service, Office of Information Transfer, 1201 Oak Ridge Drive—Suite 200, Fort Collins, CO 80525-5589.

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